REMARKS/ARGUMENTS

Reconsideration of this application is requested. Claims 1-4, 6 and 9-21 are in the case.

I. THE 35 U.S.C. § 112, SECOND PARAGRAPH, REJECTION

Claims 1-9 stand rejected under 35 U.S.C. § 112, second paragraph, as allegedly indefinite for the reasons stated on page 2 of the Action. In response, the claims have been amended. The following comments are offered.

Claim 1 is rejected as allegedly vague as to what structural features are being claimed by the "partition interface" or "agent", and the claims are allegedly unclear in view of the "compound derivative". Amended claim 1 is believed to overcome the objections regarding these expressions.

Claim 4 has been objected to as allegedly vague in regard to "partition interface" or "agent" and "compound or a derivative of the compound". In response, it is believed claim 4 as amended overcomes these objections.

With reference to the rejection of claims 5-9, claims 5, 7 and 8 have been canceled without prejudice, and claim 6 has been amended so as to be dependent on claim 5. Claim 9 has been amended to replace "pug" with "plug".

Withdrawal of the outstanding 35 U.S.C. § 112, second paragraph, rejection is now believed to be in order. Such action is respectfully requested.

II. THE ANTICIPATION REJECTION

Claims 1-9 stand rejected under 35 U.S.C. § 102(b) as allegedly anticipated by Manz et al and U.S. Patent 5,716,852 to Yager et al. That rejection is respectfully traversed.

Claim 1 as amended is believed to be novel. Neither Manz nor Yager describes a first conduit for flowing a first compound therethrough and a second conduit for flowing a second fluid therethrough. Moreover, there was no disclosure in either of those references of one or more restricted openings between the first and second conduits to allow contact between the first and second fluids at one or more restricted openings.

Amended claim 4 is also believed to be novel over the cited art. Neither Manz nor Yager describes moving the first fluid through the conduit to bring it into contact with a second fluid via a partitioning interface formed between the first fluid and the second fluid to allow any partitioning of the compound through the partition interface, with the partition interface being formed by contact between non-miscible phases.

In light of the above, it is believed that the outstanding anticipation rejection should now be withdrawn. Such action is respectfully requested.

III. CLAIM AMENDMENTS

Independent claim 1 has been amended to claim a system for the determination of at least one physicochemical property of a compound, and is based on the description at page 2, lines 11-13. Part (i) has been amended to define first and second conduits for flowing respective first and second fluids therethrough, based on the

description at page 6, lines 25-25 and page 11, lines 28-29. Part (ii) has been amended to include the feature whereby one or more restricted openings are present between the first and second conduits to allow contact between the first and second fluids at the one or more restricted openings, based on the description at page 6, lines 25-28 and page 11, lines 27-28. Also, the feature whereby the first and second fluids contact via a partitioning interface has been included, based on page 4, lines 3-7 and page 5, lines 7-9. The word "agent" has been replaced by "fluid", based upon the description at page 3, lines 23-26. Part (iii) has been amended to clarify that the presence of compound is measured to determine the physiochemical property. The words "compound derivative" have been deleted.

Claim 2 is based upon original claim 2.

Claim 3 remains unchanged.

Independent claim 4 is based on original claim 4 and the description at page 4, lines 3-7 and page 5, lines 7-9. Claim 4 has also been amended to claim a method for the measurement of one or more physiochemical property of a compound, and is based on the description at page 2, lines 11-13. The word "agent" has been replaced by "fluid", based upon the description at page 3, lines 23-26. The words "compound derivative" have been deleted.

Claim 5 has been deleted.

Claim 6 is based upon claim 5.

Claim 7 has been deleted.

Claim 8 has been deleted.

Claim 9 remains unchanged except that "barrier pug" has been corrected to read "barrier plug".

New claims 10 and 11 are based on the description at page 4, lines 3-7 and page 5, lines 7-9.

New claim 12 is based on the description at page 4, lines 3-7 and page 5, lines 7-9.

New claim 13 is based on the description at page 4, lines 3-7.

New claim 14 is based on the description at page 2, lines 19-21and page 14, line 4.

New claim 15 is based on the description at page 6, lines 25-28, page 11, lines 27-28, page 4, lines 3-7 and page 5, lines 7-9.

New claim 16 is based on Fig. 1 and on the description at page 10, lines 30-31.

New claim 17 is based on Fig. 1 and on the description at page 12, lines 15-19.

New claim 18 is based on Fig. 1 (that part of the diagram to the right of barrier plug 3) and on the description at page 12, lines 11-17.

New claim 19 is based on the description at page 11, lines 7-9.

New claim 20 is based on the description at page 11, lines 7-9.

New claim 21 is based on the description at page 11, lines 7-9.

No new matter is entered. Entry of the claims as amended is respectfully requested.

IV. SPECIFICATION

The specification has been amended to include customary headings, including a brief description of the drawings. No new matter is entered.

Allowance of the application is awaited.

Respectfully submitted,

NIXON & VANDERHYE P.C.

By: _____
Leonard C. Mitchard
Reg. No. 29,009

LCM:lfm
1100 North Glebe Road, 8th Floor
Arlington, VA 22201-4714
Telephone: (703) 816-4000
Facsimile: (703) 816-4100

Attachment: Abstract of the Disclosure

ABSTRACT OF THE DISCLOSURE

System for determination of at least one physicochemical property of a compound including a microfabricated device having an internal surface defining a first conduit for flowing a first fluid therethrough, compound being present in the first fluid, and a second conduit for flowing a second fluid therethrough. One or more restricted openings are present between the first and second conduits to allow contact between the first and second fluids at the one or more restricted openings via a partitioning interface formed between the first fluid and the second fluid, the partition interface being formed by contact between non-miscible phases. A detector is provided for measuring the amount of compound present within the first fluid or the second fluid or both. Presence of compound in either the first or second fluid or both is measured to determine the physical chemical property due to the partitioning of the compound through the compound interface.